Chapter 7: Transportation Facilities Plan

Introduction

The Transportation Facilities Plan (TFP) is the long-range financially-constrained portion of the Buildout Plan. The Buildout Plan contains all the capital needs identified to provide a complete and well-maintained transportation system for the City of Redmond well into the future. The TFP has been prioritized to best meet the transportation vision in support of the 2030 land use plan. This 18-year Transportation Facilities Plan is financially constrained by the revenue forecast for that same time period consistent with the Washington State Growth Management Act.

The chapter describes three elements essential to the formation of the TFP: 1) relationship to the Buildout Plan, 2) the revenue forecast, and 3) a strategically prioritized list of specific capital improvements and programs.

The Buildout Plan

The Buildout Plan is an ambitious list of important multimodal improvements needed to address specific gaps and issues in the current transportation system (Appendix E). It is not, however intended to be an exhaustive list of every transportation infrastructure deficiency. Therefore, the annual programs are intended to meet the need over time for deficiencies such as missing pedestrian facilities and targeted safety improvements.

The full implementation of the Buildout Plan over time is expected to be a partnership among all stakeholders of the transportation system in Redmond including neighboring jurisdictions, private developers, businesses, residents, and granting agencies.

The Buildout Plan, Transportation Facilities Plan, and Three-Year Action Plan

The priority portion of the Buildout Plan (Figure 1) is the 18-year Transportation Facilities Plan (TFP), a funding constrained plan guiding transportation investment between 2013 and 2030. These priority projects and programs are the City's commitment to transportation improvements needed to keep pace with growth, complete system deficiencies, and provide for essential operations and capital maintenance needs. Furthermore, the Three-Year Action Plan (Chapter 8) identifies high-priority action items to move the TFP forward and begin implementation between 2013 and 2015.

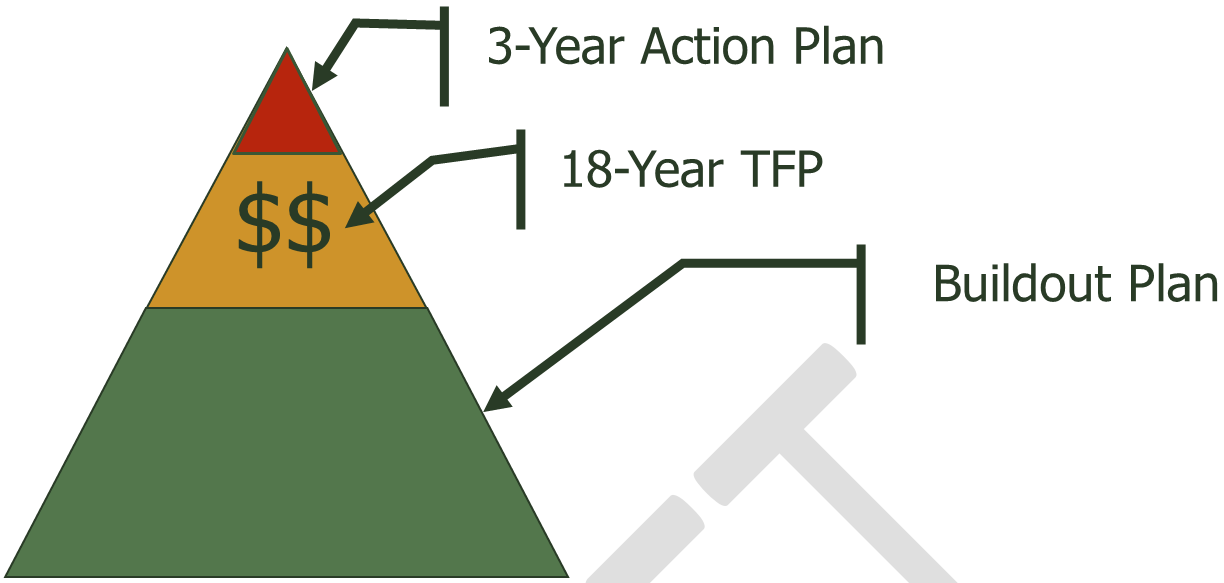

Figure 1 Relationship among the Buildout Plan, TFP, and 3-year action plan.

Revenue Sources and Forecast

Process to Develop the 2013-2030 Revenue Forecast

Each of the revenue sources has been forecasted through 2030. The forecast makes assumptions about basic considerations such as the state of the economy, whether the City would continue to devote that revenue source to transportation, and rate changes.

The first six years of the TFP revenue forecast are derived from the revenue projections in the 2013-2018 Capital Investment Program (CIP) approved through the Budgeting by Priorities process in 2012. The remaining years (2019-2030) are calculated based on a flat rate (does not include inflation) to match the project cost estimates which were estimated in 2012 dollars. Project cost inflation in outer years (2019-2030) can be estimated only if the City knows exactly what year each project would be initiated. While this is known for the Capital Investment Program (CIP), it is not known for the entire 18 year period.

Overview of Revenue Sources and Assumptions

The City's transportation investments are supported by a variety of revenue sources (Figure 2) that include:

- City taxes and fees – General funds from property and sales taxes, Business Transportation Tax, transportation impact fees, etc.
- Funds from other governmental agencies – Grants from state and federal transportation agencies, cost participation by other cities in Redmond projects, and transfers of funds pursuant to agreements (such as the BROTS agreement with Bellevue);
- Developer payments – Funds provided by developers to ensure access and mitigate site-related transportation impacts; and,
- Miscellaneous – Interest earnings, carry-forward fund balances associated with projects initiated in prior years, intergovernmental transfers, and other funds.

Table 1. TFP Revenue Forecast 2013-2030

Revenue Source	Forecast ($Millions) 2013-2030	%	Description of Source
General Fund Transfer	41.9	11%	Council appropriation from City General Fund
Pavement Management General Fund	5.4	1%	Council appropriation from City General Fund
Real Estate Excise Tax	34.2	9%	Tax on property sales in Redmond
Motor Vehicle Fuel Tax	7.0	2%	State transportation funds to Redmond
Other Jurisdictions	2.7	1%	Cost participation by other agencies in Redmond projects
Federal and State Grants	28.2	8%	Cost participation grants for specific projects
Business Tax	40.8	11%	Employment based tax - Redmond employers
Impact Fees	132.2	36%	Transportation impact fee cash payments by developers; or construction value by developers
Developer Contributions	34.3	9%	Value of developer payments or construction for specific projects; not impact fee credited
Miscellaneous Sources	23.4	6%	Interest earnings, rent, surplus property, revenue for completed projects for concurrency
Miscellaneous Carryovers	18.9	5%	Funds brought forward; net of outstanding PW Trust Fund Loans of $1.9M , non-TFP projects and overhead
	369.0	100%	

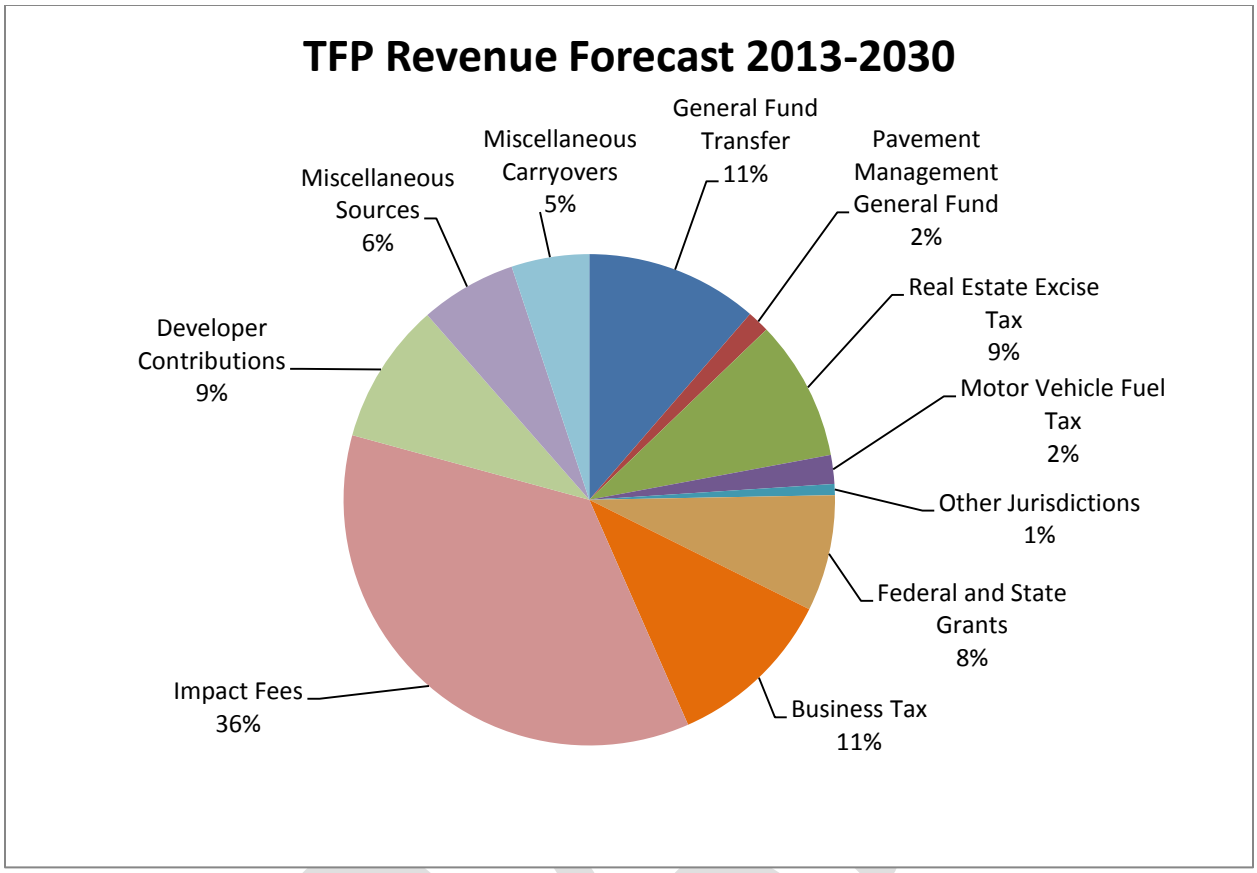

Figure 2. TFP Revenue Forecast, 2013-2030

Individual revenue sources () are described in more detail below:

- **General Fund** – This revenue source is comprised of sales tax, property tax, utility tax and other licenses and fees. Transportation currently receives 55% of the 5% General Fund revenues that are transferred to the CIP functional areas (minus development revenues and significant one-time collections). However, one-time monies can be received to support specific transportation capital projects. Forecast Assumption: assumes continuation of City Council appropriation at 55% of the 5% General Fund transfer to Transportation.

- **Pavement Management General Fund Transfer** – By policy, $300,000 per year is transferred from the General Fund to the Pavement Management Program for the preservation of roadway asphalt. Forecast Assumption: assumes General Fund transfer will continue at historical level of $300,000 per year.

- **Real Estate Excise Tax (REET)** – REET is a tax on all sales of real estate at a rate of 0.5% of the selling price of a property within Redmond city limits. King County collects REET funds for the City and distributes them to the City. REET is restricted to expenditures on capital projects. Transportation also currently receives 55% of the REET tax. Forecast Assumption: assumes transportation will continue to receive 55% of REET collected in the city. REET declined by approximately 50% from its historical base during 2009-2010 and only slightly grew in 2011-2012 resulting in a lower baseline for forecasting.

- **Motor Vehicle Fuel Tax (Gas Tax)** – In Washington State, cities receive a portion of the state-collected gasoline tax. Gas tax is imposed as a fixed amount per gallon of gas purchased and is dedicated to

transportation capital improvements. As fuel efficiency increases the amount of gas taxes collected per mile of travel will decrease but this is expected to be offset by population increase over the next 18 years. Forecast Assumption: assumes continuation.

- **Transfers from Other Jurisdictions** – Cost participation from other agencies in Redmond projects. Forecast Assumption: based on historical collections.

- **Business Tax** – Currently, a $57.00 fee is assessed per employee to businesses operating in Redmond to support transportation and transportation demand management projects. Forecast based on estimated growth in employment. Business taxes are instrumental in leveraging grants. Forecast Assumption: assumes continuation at rate of $57.00/FTE (full-time equivalent) and is projected to grow by approximately 1.2% per year, commensurate with projected employment growth in the city. This forecast does not include approximately 50% of the business tax revenue collected which is used to pay outstanding debt for the Bear Creek Parkway project.

- **Impacts Fees** – The City collects impact fees from developers for their impact on the transportation system. Impact fees are dedicated to transportation capital improvements that provide new capacity. The fees cannot pay for existing deficiencies in level of service for the public facilities or normal maintenance and repairs. Impact fee revenue is subject to credits for developer constructed improvements for capacity projects within the TFP. Impact fee revenue is a blend of developer constructed improvements (credits to impact fees) and cash payments based on land use. Impact fees are instrumental in leveraging grants. Forecast assumption: based on 2030 land use targets and 2013 fee schedule. Commercial, industrial, and retail impact fee forecast is based on historical trend of business tax collection commensurate with projected employment growth in the city. Single-family and multi-family forecast is calculated based on 2030 land use targets. Assumes no rate increase beyond 2013 for forecasting purposes.

- **Developer Contributions** – Comprised of cash payments towards specific projects or the value of developer constructed improvements that exceed impact fee credits. Forecast assumption: based on existing developer agreements or known contributions to specific projects. Forecast does not speculate contributions into the future beyond known agreements.

- **Federal and State Grants** – Contributions by a federal or state government to support a particular transportation improvement. Each grant has specific rules and guidelines about what type of projects they will fund. Grants generally require a funding match that the City must contribute towards the cost of the project. If a project uses federal funds the level of analysis, documentation, outreach, and commitment is generally more detailed or stringent. Forecast assumption: grants that have been awarded are included in the first six years. Future grant revenue forecast is conservative.

- **Miscellaneous Sources and Carryover** – Comprised of interest earnings on cash balances in the transportation fund, rental income, surplus property sales, other miscellaneous sources, and carry-forward fund balances associated with projects initiated in prior years.

Overview of Forecast and Growth Assumptions – 2013-2030

Forecast Assumptions

- Forecasts flat to moderate growth in revenues that reflect a slowly rebounding economy.
- The forecast does not include any increases to rates or new sources of revenue.
- Revenues and project costs also include the portion of CIP-funded projects that have occurred prior to 2013 and are continuing into the 2013-2018 timeframe.
- Ensures debt obligations are paid from existing revenues.

Growth Assumptions

- Growth pays for growth – Impact fees and developer contributions account for 45% of the TFP revenues.
- Pipeline projects are either underway or have concurrency through a development agreement.
- Transportation impact fees paid by developer are a blend of built projects (developers receive impact fee credits when constructing an impact fee eligible project) and cash towards TFP projects.
- Developer contributions are the portion of developer built projects that exceed the limit of impact fee credits.

Development of the Transportation Facilities Plan (TFP)

The Transportation Facilities Plan is part of the overall City of Redmond Capital Investment Strategy (CIS) or "Vision Blueprint" which is a comprehensive listing of all public infrastructure projects needed and funded through 2030. Transportation is the largest of the individually funded capital plans and integral to coordinating with the other capital projects within the city particularly with utility projects, stormwater improvements, and parks and trails. Transportation tends to provide a framework for how to consider the design and timing of many other City capital projects so all of the City infrastructure can be integrally designed and provided most efficiently.

The prioritization of specific transportation projects includes those expected to make meaningful progress toward advancing the City vision and the aspirational targets for transportation. Individually, all capital improvements in the TFP are closely aligned with the five transportation strategies (support urban centers, improve travel choices, support light rail, increase neighborhood connections, and enhance freight mobility).

The TFP is balanced in three ways. First, it is balanced across traveling modes. Figure 3 indicates that the City of Redmond continues to focus on multimodal improvements to provide travel choices and mobility while making significant strides to complete the infrastructure for pedestrians and bicyclists. Vehicular capacity

improvements at critical locations are included to relieve congestion and support freight mobility. Redmond makes a small investment about transit in the TFP. However, the region is making a huge transit investment that will connect Downtown Redmond with Bellevue and Seattle through the East Link light rail.

Second, the TFP is not just about building or providing new capital improvements. It has dedicated funding to preserve key infrastructure including pavement and bridges. 13% of the TFP funding is for preservation in the formats of both projects and programs (Figure 3). Third, the TFP is balanced across urban centers and neighborhoods. Slightly more than half of all TFP projects are located in neighborhoods outside of urban centers (Figure 4).

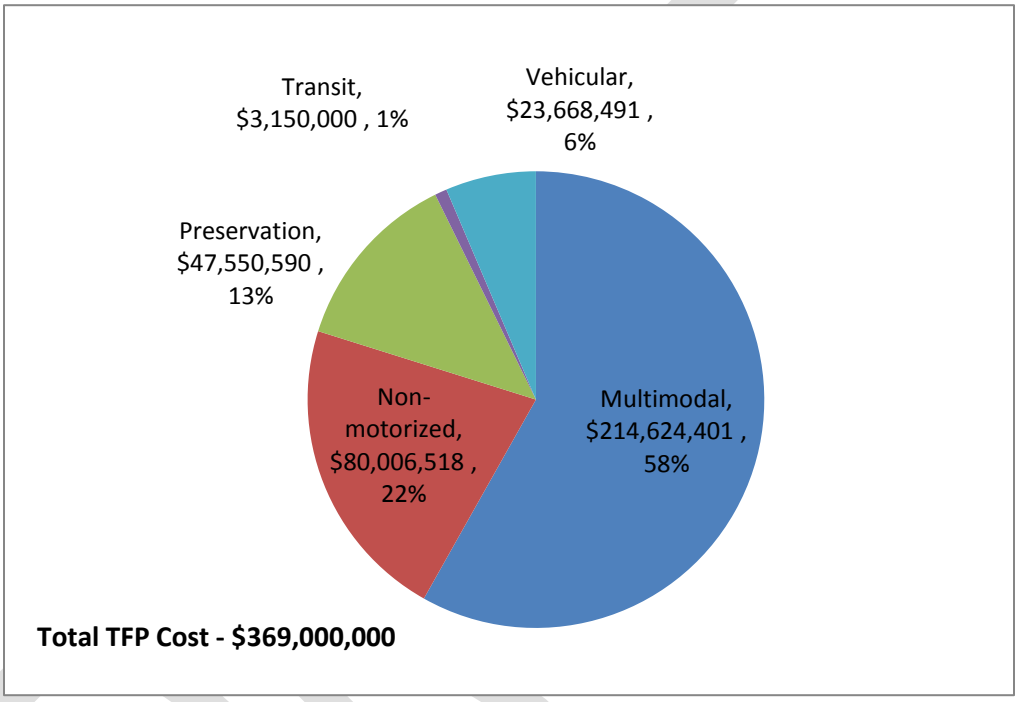

Figure 3. TFP Investment by category

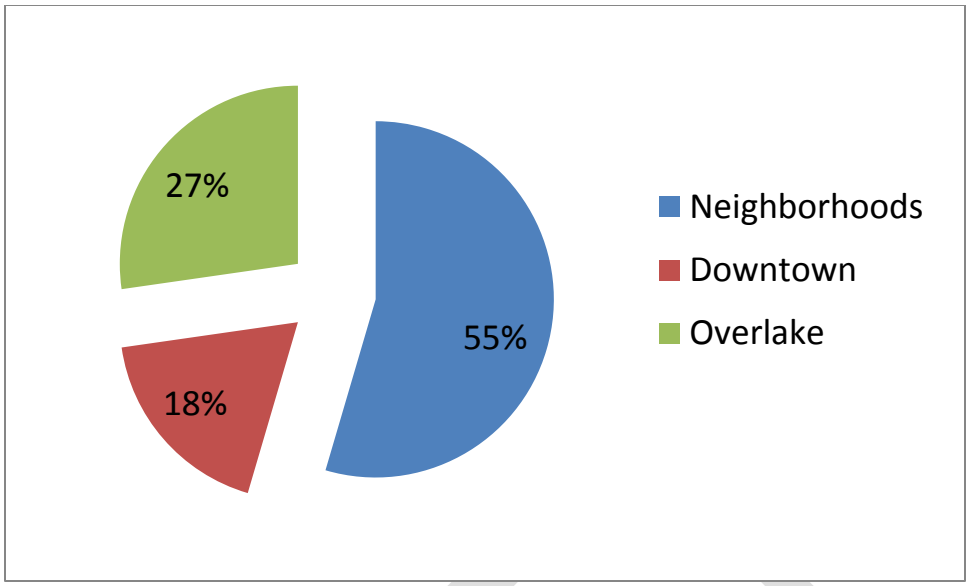

Figure 4 . TFP project distribution by area (number of projects).

Projects and Programs

TFP capital investments are arranged into two types: projects and programs. Projects and programs have distinct characteristics, and they are designed to complement each other.

Projects are standalone efforts that have a beginning and an end, are location-specific, have a clear project scope, address multiple issues, and have set cost estimates and funding sources. An example of a project is a bridge replacement or the construction of a segment of sidewalk. Projects are usually informed by a problem identified by staff or a set of comments from the community collected during a set period of time.

Programs are ongoing efforts that address a particular need, such as bicycle improvements or neighborhood traffic safety. The scope and cost estimates of work undertaken as part of a program can vary depending on community needs and the funding environment (e.g. grant opportunities). An example of a program is the Pedestrian Program, which identifies deficiencies in the pedestrian environment and funds construction to fix a set of those deficiencies every other year. Community input continuously informs programs. See Appendix G for more information about programs.

The TFP project list is grouped into three implementation time periods: near-term (Table 2), mid-term (Table 3), and long-term (Table 4). Table 5 lists TFP programs. Refer to Figure 5 for the locations of all TFP projects. See Figure 6 for TFP projects in the Downtown urban center. See Figure 7 for TFP projects in the Overlake urban center.

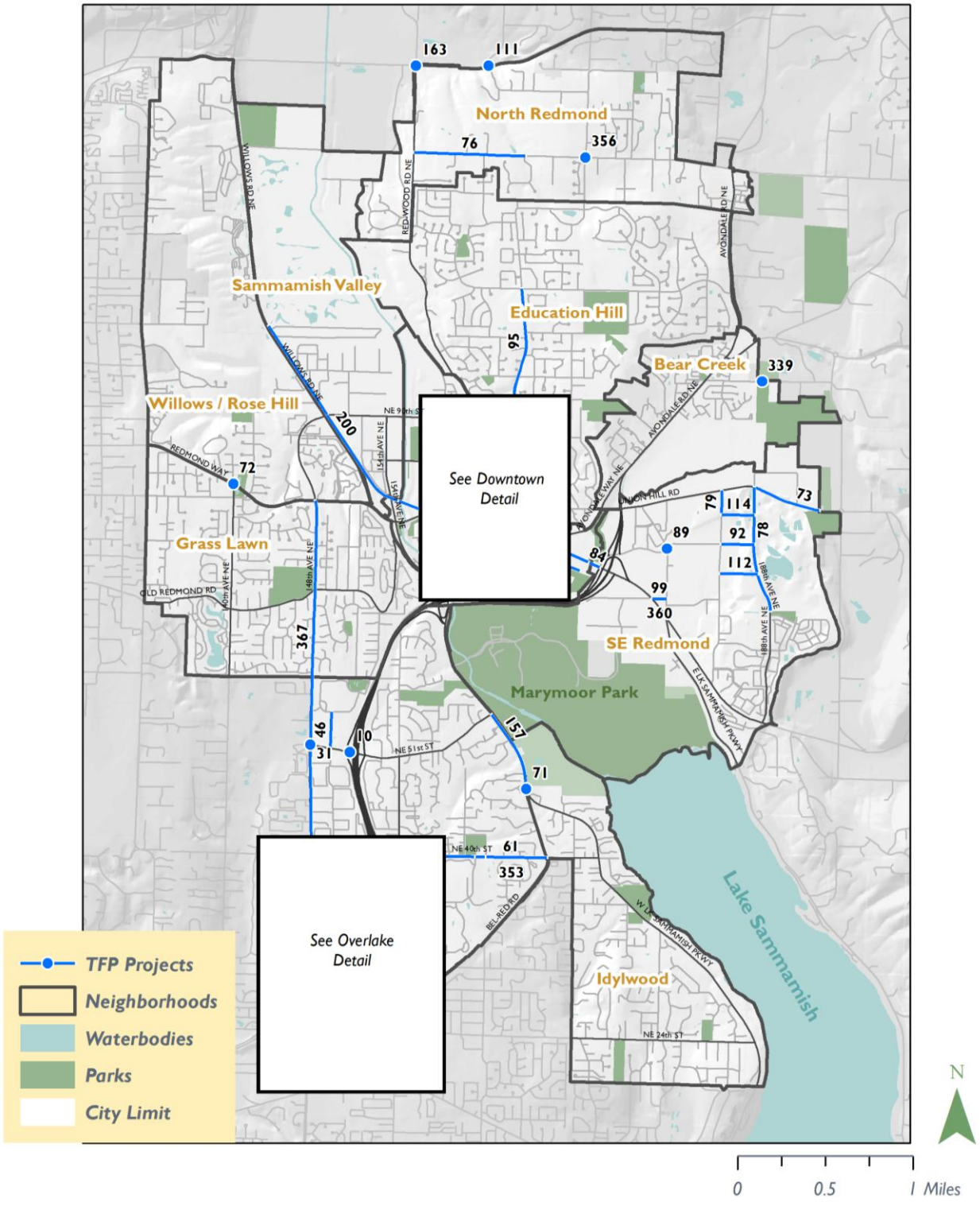

Figure 5. Transportation Facilities Plan projects

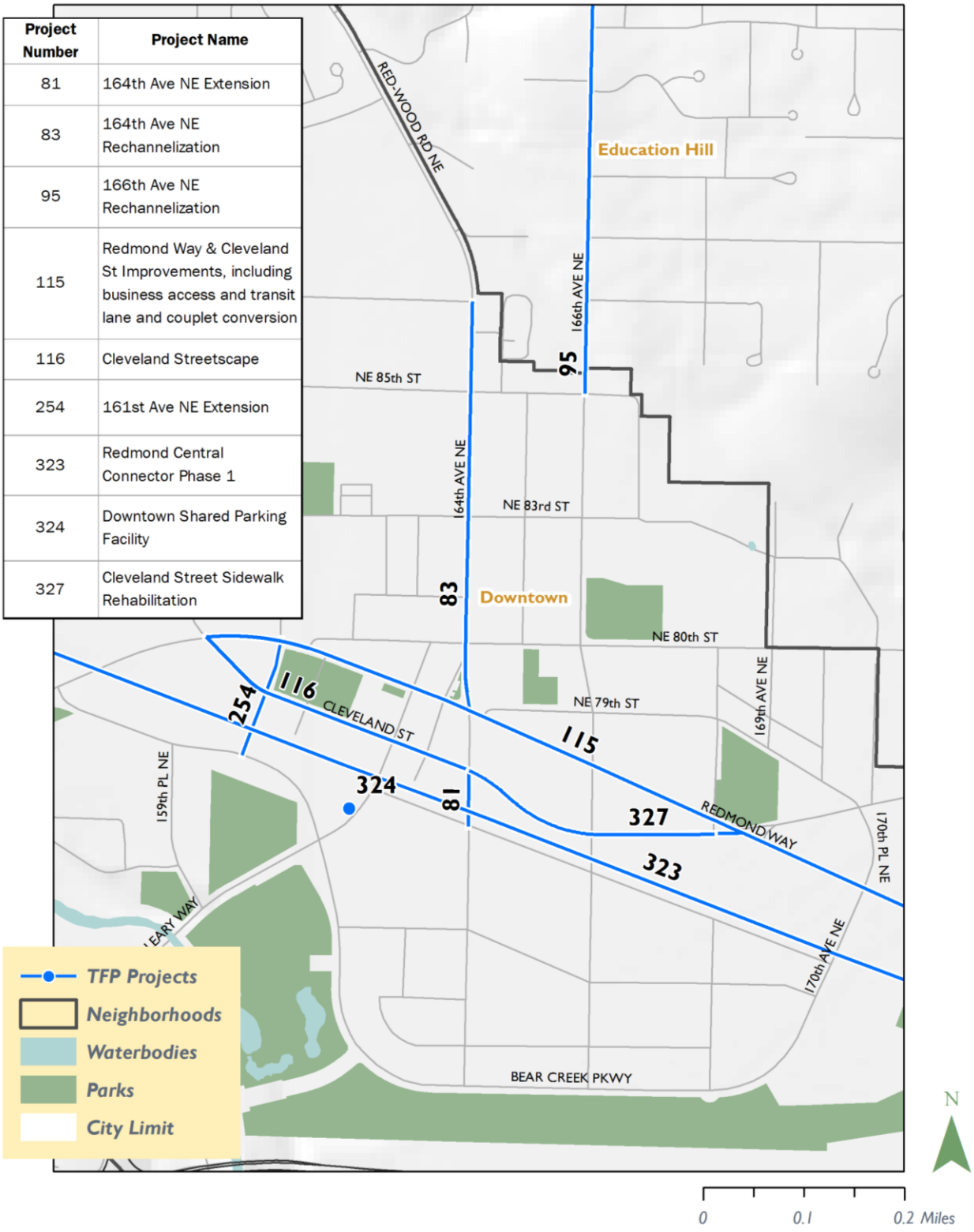

Figure 6. Transportation Facilities Plan projects: Downtown detail.

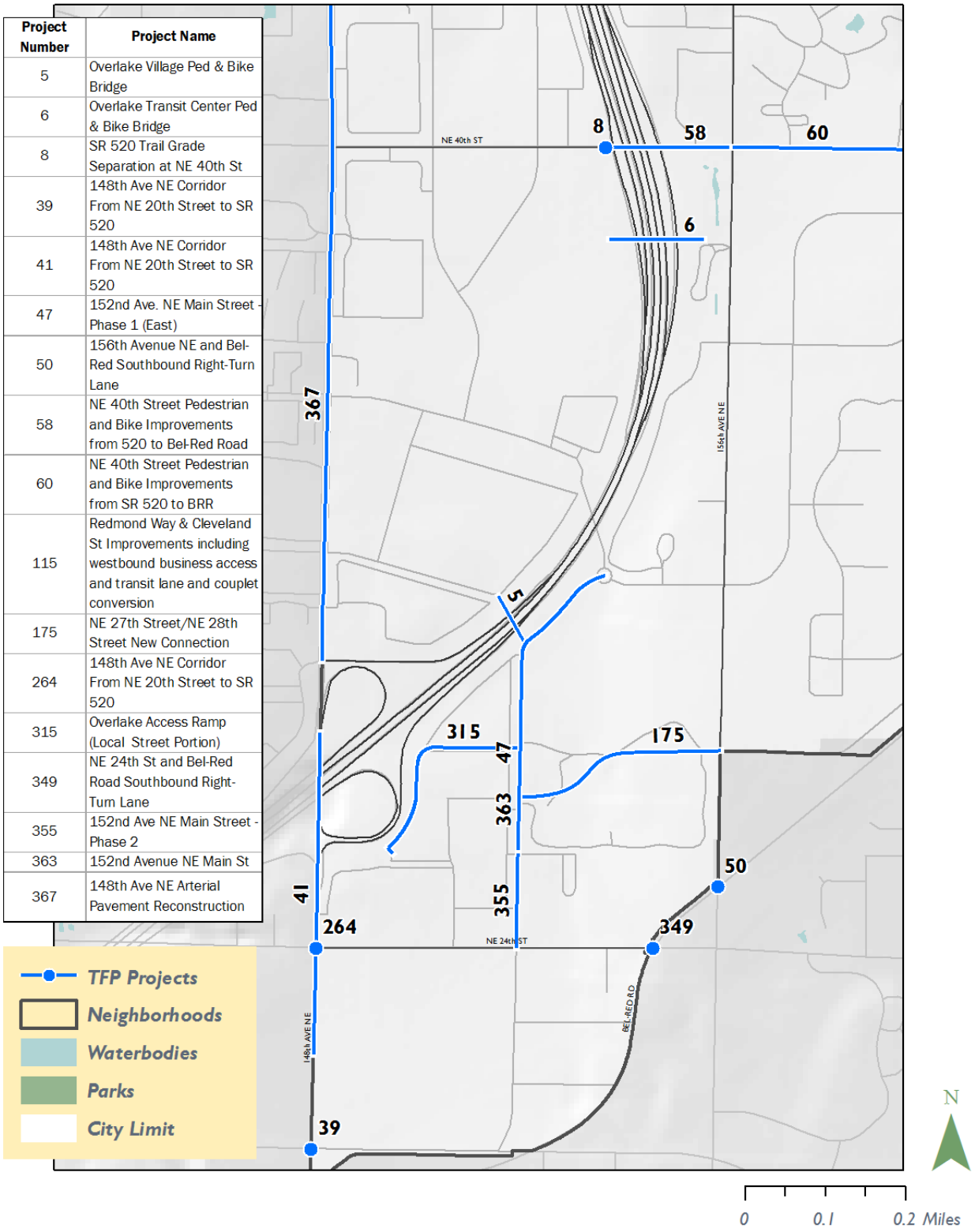

Figure 7. Transportation Facilities Plan projects: Overlake Detail

Table 2 2013-2030 Near-Term TFP Projects

Key for column "Significant Support for These Strategies"

1 – Support for Urban Centers
2 – Neighborhood Access
3 – Travel Choices & Mobility
4 – Prepare for Light Rail
4 – Support Freight Mobility

ID	Name	Description	Significant Support For These Strategies	General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)	Cost Estimate ($1000s)	Source
50	156th Avenue NE and Bel-Red Southbound Right-Turn Lane / West Neighborhoods	Add southbound right turn lane on 156th Ave NE.	**1,** 5	Economic vitality	$2,400	Overlake Master Plan, previous TFP
73	Union Hill Rd Phase III Widening / East Neighborhoods	Widen Union Hill Rd from 188th Avenue NE to eastern city Limits. Improvements include 2 through lanes in each direction, left turn lanes, bike lanes, curb, gutter, sidewalks, street lights, storm drainage, underground power and utility pole relocation, right-of-way and easement acquisition.	**2, 5,** 3	Economic vitality, environment	$4,960	SE Redmond Area Transportation Study, previous TFP

78	188th Avenue NE Extension / East Neighborhoods	Construct new 188th Ave NE arterial from NE 65th Street to Union Hill Rd. Improvements include 1 through lane in each direction, left turn lanes, bike lanes, curb, gutter, sidewalks, transit amenities, street lights, storm drainage, right-of-way and easement acquisition.	**2, 5,** 3	Economic vitality	$23,400	SE Redmond Area Transportation Study, Taylor development agreement, previous TFP
79	185th Ave NE Extension (complete) / East Neighborhoods	Construct new 185th Ave NE arterial from NE 80th Street to Union Hill Road. Improvements include one through lane in each direction, left turn lanes, sidewalks, street lights, storm drainage, right-of- way, easements, and traffic signal at Union Hill Road.	**2, 5,** 3	Economic vitality	$2,697	SE Redmond Area Transportation Study, UPS development agreement, previous TFP
81	164th Ave NE Extension / Downtown	Construct new 164th Ave NE from NE 76th St to Cleveland St. Improvements include 1 through lane in each direction, bike lanes, parking, sidewalks, transit facilities, street lights, storm drainage, right-of-way and easements.	**1, 2, 3**	Economic vitality	$3,500	Downtown East-West Corridor Study, previous TFP
83	164th Ave NE Rechannelization / Downtown	Reconfigure 164th Ave NE from NE 80th to NE 87th St to 1 through lane in each direction, center left turn lane, bike lanes, pedestrian amenities, and transit facilities.	**1, 2, 3**	Safety	$654	Previous TFP

89	NE 76th St & 178th Pl NE Intersection Improvements / East Neighborhoods	Widen intersection to allow right turn, left turn, and through lanes in all directions, Improve turning radii for trucks at intersection of NE 76th St / 178th Pl (especially SB to EB, and WB to NB), widen 178th lanes to north of intersection to avoid impacts to well house, add bicycle lanes through intersection in all directions, improve sight distance, stormwater, utilities, and property needs such as easements. Install vehicle detection and traffic cameras.	**5,** 2, 3	Safety	$1,400	NE 76th Street Corridor Study, Freight Mobility Study, previous TFP
92	NE 76th St Extension / East Neighborhoods	Construct new NE 76th St from 185th Ave NE to 188th Ave NE. Improvements include 1 through lane in each direction, left turn lanes or medians to create a 3 lane section, bike lanes, sidewalks, street lights, traffic control, storm drainage, right-of-way and easements. Consider roundabout at 185th Ave and 76th St.	**2, 5,** 3	Economic vitality	$15,660	NE 76th St Corridor Study, staff, Taylor development agreement, previous TFP
95	166th Ave NE Rechannelization / East Neighborhoods	Reconfigure 166th Ave NE from NE 85th St to NE 104th St to 1 through lane in each direction, center left turn lane and bike lanes. Collaborate with pavement management for its resurfacing needs. Add pedestrian crossings coordinated with bus stops.	**2, 3**	Safety	$850	Education Hill neighborhood plan, previous TFP

115	Redmond Way & Cleveland St Improvements including wb BAT lane and Couplet Conversion / Downtown	Convert Redmond Way from 160th Avenue NE to Avondale Way to one through lane in each direction and center turn lane with west end having two westbound starting at 161st Avenue NE and east end having two eastbound lanes starting at 168th Avenue NE. Convert Cleveland Street to one through lane in each direction. Relocate transit stops to Redmond Way. Improvements include curb extensions, widened sidewalks, shared lane markings, pedestrian amenities, transit amenities, gateway treatments, wayfinding, and realignment of street at eastern and western ends to improve traffic flow. Improve the rightmost lane on westbound Redmond Way to be a Business And Transit access lane.	**1, 2,** 3, 4	Economic vitality	$17,425	Downtown East-West Corridor Study, Sound Transit for BAT lane, previous TFP
116	Cleveland Streetscape / Downtown	Improve Cleveland Street to a pedestrian-friendly Main Street. Improvements include one through lane, parking, and sidewalk in each direction, mid-block crossings, street lights, utilities, stormwater treatments, public art, bicycle racks, pedestrian amenities, street furnishing, trees, traffic and wayfinding signs, and realignment of street at eastern and western ends to improve traffic flow.	**1, 3**	Economic vitality, environment	$6,322	Development agreement, Downtown East-West Corridor Study, previous TFP

163	SR 202 & NE 124th St Intersection Improvements (complete) / East Neighborhoods	Widen NE 124th Street adding additional east/west lanes, modify the traffic signal and connect to the city's traffic management center. In addition, bicycle lanes, sidewalks, and a storm collection and treatment system will be added.	**3,** 5	Safety, environment	$5,125	North Redmond neighborhood plan, Wedge subarea plan, RedWood Corridor Study, previous TFP
175	NE 27th Street/NE 28th Street New Connection / Overlake	Construct a new east west NE 27th Street between 152nd Avenue NE and 156th Avenue NE with a three-lane public roadway (narrowing to two lanes adjacent to the future park) with parking and bike lanes along both sides of the street, and intersection improvements at 152nd Ave NE and 156th Ave NE. The 156th intersection improvements will include frontage improvements on the west side of 156th from about 300 feet north of the intersection to about 700 feet south of the intersection.	**1, 2, 3,** 4	Economic vitality	$14,300	Overlake Master Plan, Group Health development agreement, previous Buildout Plan
200	Redmond Central Connector Segment II / West Neighborhoods	Complete the second segment of the Redmond Central Connector, including regional trail and aesthetic enhancements.	**2, 3,** 1, 4	Safety	$5,590	Willows corridor study, previous TFP

254	161st Ave NE Extension (complete) / Downtown	Construct new 161st Ave NE from Bear Creek Pkwy Extension to Redmond Way. Improvements include 1 through lane in each direction, left turn lanes, bike lanes, parking, sidewalks, street lights, storm drainage, right-of-way, easements and traffic signals at Cleveland St and Bear Creek Pkwy.	**1, 2, 3,** 4	Economic vitality	$6,850	Downtown East-West Corridor Study, previous TFP
323	Redmond Central Connector Phase 1 / Downtown	Complete the first segment of the Redmond Central Connector, including regional trail and aesthetic enhancements. Remove rail. Coordinate with the Downtown Stormwater Trunkline Project.	**1, 2, 3,** 4	Economic vitality	$4,750	Downtown Transportation Master Plan, previous Buildout Plan
324	Downtown Shared Parking Facility / Downtown	Shared parking facility at the intersection of Leary Way and Bear Creek Parkway. Intent is to provide a shared parking resource within the downtown, and facilitate 'right sizing' of private segregated parking in the downtown urban center.	**1**	Economic vitality	$500	Previous TFP
327	Cleveland Street Sidewalk Rehabilitation / Downtown	Address significant sidewalk maintenance issue caused by street trees by replacing sidewalk. This is an interim treatment of the couplet conversion.	**3,** 1, 4	Safety, maintenance	$271	Staff and community input
339	NE 95th Street Bridge Replacement / East Neighborhoods	Replace the NE 95th Street Bridge over Bear Creek. Improvements shall comply with environment requirements.	**2,** 3	Safety, maintenance, environment	$330	Dept. of Ecology Requirement, staff and community input, Bear Creek Neighborhood Plan

353	NE 40th Street Sidewalk Rehabilitation / Overlake	Replace sidewalks along the north side and part of the south side along the NE 40th Street between 164th Court and Bel-Red Road.	**3,** 1, 4	Safety, maintenance	$377	Staff and community input,
356	NE 116th and 172nd Avenue NE Roundabout / East Neighborhoods	Construct a roundabout at NE 116th Street and 172nd Avenue NE. Improvements include sidewalks, bike lanes, vehicular lanes, stormwater, utilities, and street lights.	**2, 3**	Safety, environment	$6,500	NE 116th St corridor design process, North Redmond neighborhood plan, previous TFP

Table 3 2013-2030 Mid-Term TFP Projects

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
5	Overlake Village Ped & Bike Bridge (ST) / Overlake	Provide a new pedestrian and bike connection over SR 520 between the Overlake Village light rail station and NE 31st Street west of SR 520. Coordinate with projects # 181 and # 43.	**1, 2, 3, 4**	Safety	$8,800	Overlake Village station location charrette process, previous Buildout Plan

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
6	Overlake Transit Center Ped & Bike Bridge (ST) / Overlake	Provide a new pedestrian and bike connection over SR 520 between the Overlake Transit Center and west side of SR 520 and 520 Trail (in the vicinity of the NE 38th Street alignment) and the SR 520 Trail, integrating with the future light rail station. Ensure public access between the 520 Trail and the Overlake Transit Center. Coordinate with existing transit stops.	**1, 2, 3, 4**	Safety	$8,000	Microsoft Ped, Bike, and Fitness Study; Overlake Master Plan; previous TFP
8	SR 520 Trail Grade Separation at NE 40th St / Overlake	Grade separate 520 Trail at NE 40th Street.	**1, 2, 3,** 4	Safety	$5,250	Microsoft Ped., Bike, and Fitness Study; Overlake Residential Area neighborhood plan; previous TFP
31	148th Ave NE and NE 51st St Westbound Right-Turn Lane / West Neighborhoods	Add a second right turn lane from westbound NE 51st Street to northbound 148th Avenue NE.	**3,** 1, 5	Economic vitality	$1,032	Previous TFP

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
46	150th Ave NE and NE 51st Street Traffic Signal / West Neighborhoods	Add north leg (on private property) to intersection of 150th Avenue NE and NE 51st Street and signalize this intersection. The intent is for improvement on the north leg on campus to include two southbound left turn lanes, one through lane in each direction, bike lanes, sidewalks, transit amenities, street lights, utilities, and stormwater drainage. Relocate eastbound transit stop to far side of new intersection.	**3,** 1, 2	Economic vitality	$700	Overlake Master Plan, previous TFP

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
47	152nd Ave. NE Main Street - Phase 1 (East) / Overlake	Implement a multimodal pedestrian corridor concept on 152nd Avenue NE from NE 26th Street to NE 31st Street to create a lively and active signature street in the Overlake Village. The cross section for the improvements would include one through lane in each direction, turn lanes as necessary, on-street parking and pedestrian and bicycle facilities as described in the Appendix 7 in the Redmond Zoning Code. Other improvements include intersection improvements at NE 24th , NE 26th, NE 27th, and NE 28th Streets, storm drainage, LID, street lighting, pedestrian amenities, transit amenities, right-of-way, easements, and utilities. Locate arterial transit stop within immediate access of the Overlake Village light rail station. Part 1, project #47, includes half-street improvements by developer of the former Group Health site. Part 2, project # 363, includes half-street improvements for the other half-street by future developers.	**1, 2, 3,** 4	Economic vitality, environment	$7,100	Previous TFP updated by Ordinance No. 2575, Overlake Master Plan

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
58, 60, & 61	NE 40th Street Pedestrian and Bike Improvements from 520 to BRR / Overlake	58: Resize vehicular lane width to 11 feet, raise the sidewalk on the south side of the bridge and reduce this sidewalk to 9 feet and enhance pedestrian realm by eliminating the traffic barrier between the south sidewalk and vehicular lane, and add 5.5-foot bike lanes in both directions. Improvements include two travel lanes, two turn lanes, one bike lane, and one sidewalk in each direction of the street, and streetscape including gateway wayfinding and art elements. 60: Add bike lanes on both sides. Improvements include two vehicular lanes in each direction, one turn lane, bike lanes and 8 foot sidewalks with planter strips on both sides, planter strip, streetscape including gateway wayfinding and art elements, stormwater treatments, street lights, utilities, and easement acquisition. 61: Within existing right-of-way and easements, resize vehicular lane width to 10 feet and add a 5 feet bike lane in the westbound direction. Improvements include sidewalks in both directions, a 5 feet bike lane in the westbound direction, one 10 feet vehicular lane in both directions, an 11 feet turn lane, streetscape, stormwater treatments, street lights, and utilities.	**1, 2, 3,** 4	Safety	$4,631	Overlake Master Plan, Overlake Residential Area neighborhood plan, NE 40th St Corridor Study. 58: previous Buildout Plan, 60 & 61: previous TFP

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
71, 157	West Lake Sammamish Parkway Widening & Roundabout Phase 1 / West Neighborhoods	71: Removing exiting traffic signal at Bel-Red Road and West Lake Sammamish intersection. Install 2-lane roundabout at Bel-Red Road, West Lake Sammamish intersection and improve pedestrian facilities and provide treatments for terminus of multi-use path along eastside of roadway. 157: Acquire any needed right-of-way and extend the multi-use path on the east side of West Lake Sammamish Parkway.	**2, 3**	Safety	$9,000	Idylwood and Overlake Residential Area neighbohood plans, previous TFP
72	140th Ave NE and Redmond Way Turn Lanes / West Neighborhoods	Add second northbound left turn lane and extend bicycle lanes from NE 80th Street through the intersection of 140th Avenue NE and Redmond Way. Add eastbound right turn lane. Construct sidewalk on 140th Avenue north of the intersection up to NE 84th Street.	**3**	Economic vitality	$1,948	Previous TFP
76	NE 116th St Widening Phase I / East Neighborhoods	Complete bicycle facilities as well as the sidewalk on the north side of NE 116th Street between Red-Wood Road and 167th Place NE. Improvements coordinate with project # 356: the construction of a roundabout at NE 116th Street and 162nd Avenue NE. Phase II is Project 370.	**3,** 2	Safety	$1,719	North Redmond neighborhood plan, previous Buildout Plan
99	NE 70th Street Extension Phase 1 / East Neighborhoods	Provide the right-of-way and interim street improvements on the new NE 70th St from Redmond Way to 180th Ave NE. Coordinate with phase II, project #360, which is street improvements up to City standards	**3, 4,** 2	Economic vitality	$490	SE Redmond Area Transportation Study, previous TFP

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
111	162nd Avenue and 124th Street Intersection Improvement / East Neighborhoods	Construct a new traffic signal at 124th Avenue NE and 162nd Place NE. Includes the addition of turn lanes on NE 124th and modifications on 162nd Place for sight distance. Must meet signal warrant.	**3,** 2	Safety	$896	North Redmond neighborhood plan, previous TFP
112	NE 73rd St Extension / East Neighborhoods	Construct new NE 73rd St from 185th Ave NE to 188th Avenue NE. Improvements include 1 through lane in each direction, left turn lanes, bike lanes, sidewalks, street lights, traffic control, storm drainage, right-of-way and easements.	**2, 5,** 3	Economic vitality	$10,250	Taylor development agreement, previous TFP
114	NE 80th Street Trail Connection / East Neighborhoods	Construct new NE 80th Street Trail from 185th Avenue NE to 188th Avenue NE. Improvements include 12 foot paved, shared use path situated in a 20 foot wide easement or right-of way.	**2, 5**	Economic vitality	$1,598	Taylor development agreement, previous TFP
315	Overlake Access Ramp (Local Street Portion) / Overlake	Construct Access Street between the Overlake Access Ramp terminal and 152nd Avenue NE. Improvements on Overlake Access Street and NE 28th Street include one vehicular lane in each direction, parking, sidewalks, and left-turn lanes at the intersection of NE 28th Street and 152nd Avenue NE. Vehicular lanes are 11-foot wide on Overlake Access Street and NE 28th Street. Sidewalks on NE 28th Street are 14-foot wide. Sidewalks on the Overlake Access Street are 12-foot wide. Parking lanes are 7-foot wide. Coordinate with the terminal of Overlake Access Ramp (project #2).	**1, 2, 3,** 5	Economic vitality	$18,572	Overlake Access Ramp Interstate Justification Report, Overlake design standards, Overlake Master Plan

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
349	NE 24th St. and Bel-Red Road Southbound Right-Turn Lane / West Neighborhoods	Provide a southbound right-turn lane at the intersection of NE 24th Street and Bel-Red Road.	**3,** 1, 2, 5	Economic vitality	$1,160	Bellevue Redmond Transportation Study (BROTS) agreement, GHC development agreement, ST mitigation for East Link
360	NE 70th Street Extension Phase 2 Construction / East Neighborhoods	Construct new NE 70th St from Redmond Way to 180th Ave NE. Improvements include 1 through lane in each direction, left turn lanes, sidewalks, street lights, storm drainage, right-of-way and easements. Coordinate with phase I, project 99, right-of-way dedication and interim street improvements.	**3, 4,** 2	Economic vitality	$2,500	SE Redmond Area Transportation Study, previous Buildout Plan
367	148th Avenue NE Arterial Pavement Reconstruction / Overlake	Reconstruct portions of and provide overlay of 148th Avenue from SR 520 to Redmond Way . Make drainage improvements where needed. Examine roadway channelization for improved efficiencies.	**1, 2, 3, 4,** 5	Maintenance	$3,264	Pavement Management Program

Table 4 2013-2030 Long-Term TFP Projects

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
10	520 Trail Grade Separation at NE 51st St / West Neighborhoods	Grade separate 520 Trail at NE 51st Street.	**3,** 1, 2	Safety	$3,900	Overlake Residential Area neighborhood plan, previous TFP
39, 41, 264	148th Corridor From NE 20th Street to SR 520 / Overlake	39: Add second westbound left turn and second eastbound left turn lanes. 41: Create third northbound through lane on 148th Ave NE from NE 22nd St to SR 520 eastbound on-ramp using primarily existing right turn lanes and modify SR 520 eastbound on-ramp to allow HOV access. At NE 24th St and 148th Ave NE intersection add right turn lane on northbound approach, and extend right turn lane on westbound approach. 264: Add left turn lanes to make dual left turn lanes on the eastbound and westbound approaches on NE 24th Street at 148th Avenue.	**1, 2, 3,** 5	Economic vitality	$9,007	39 & 41: previous TFP, 264: Overlake Residential Area neighborhood plan, Overlake Master Plan

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
84	Redmond Way Bridge Modifications and Additions Over Bear Creek / East Neighborhoods	Rechannelize bridge, replacing the sidewalk on the south side of bridge with a second eastbound left turn lane. Build a ped/bike bridge on the south side of bridge, designed to accommodate a future connection between Bear Creek Trail and East Lake Sammamish Trail. Improvements include two through lanes in each direction on Redmond Way and NE 76th Street, two eastbound left turn lanes to NE 76th Street, one eastbound right turn lane to westbound SR 520 on-ramp, one sidewalk on north side of the bridge, a pedestrian/bike bridge street on the south side of the bridge, lights, storm drainage, utilities, right-of-way, and easements.	**2, 3,** 1, 5	Safety	$10,000	NE 76th Street Corridor Study, previous TFP

ID	*Name*	*Description*	*Significant Support For These Strategies*	*General Guiding Principles Emphasis (Environment, Safety, Economic Vitality, & Maintenance)*	*Cost Estimate ($1000s)*	*Source*
355, 363	152nd Avenue NE Main Street - Phase 2 (PSBP and Between 24th and 31st) / Overlake	355: Implement a multi-modal pedestrian corridor concept on 152nd Avenue NE from NE 24th Street to NE 26th Street to create a lively and active signature street in the Overlake Village. The cross section for the improvements would include 1 through lane in each direction, turn lanes as necessary, on-street parking and pedestrian and bicycle facilities as described in the Appendix 7 in the Redmond Zoning Code. Other improvements include intersection improvements at NE 24th , NE 26th, NE 27th, and NE 28th Streets, storm drainage, LID, street lighting, pedestrian amenities, transit amenities, right-of-way, easements, and utilities. Locate arterial transit stop within immediate access of the Overlake Village light rail station. 363: Implement a multi-modal pedestrian corridor concept on 152nd Avenue NE from NE 26th Street to NE 31st Street to create a lively and active signature street in the Overlake Village. The cross section for the improvements would include 1 through lane in each direction, turn lanes as necessary, on-street parking and pedestrian and bicycle facilities as described in the Appendix 7 in the Redmond Zoning Code. Other improvements include intersection improvements at NE 26th, NE 27th, and NE 28th Streets, storm drainage, LID, street lighting, pedestrian amenities, transit amenities, right-of-way, easements, and utilities. Locate arterial transit stop within immediate access of the Overlake Village light rail station. Part 1, project #47, includes half-street improvements by Group Health. Part 2, project # 363, includes half-street improvements for the other half-street by future developers.	**1, 2, 3,** 4	Economic vitality, environment	$14,000	Overlake Residential Area neighborhood plan, Overlake Master Plan

Table 5 TFP Programs

Name	Current Annual Allocation	Total Program Budget Between 2013 and 2030
Bicycle Facilities Program	$450,000	$8,323,302
Bridge Repair Program	$75,000	$1,350,000
Capital Improvement Program Management	$130,000	$2,340,000
Channelization Program	$75,000	$1,350,000
Engineering Contingency Program	$100,000	$1,800,000
Neighborhood Traffic Calming Program (NTC)	$150,000	$2,726,045
Pavement Management Program*	$1,200,000	$26,727,590
Pavement Management Program - Additional funding proposed to maintain pavement rating at current levels**		$14,400,000
Sidewalk Improvement Program	$1,400,000	$26,797,139
Street Lighting Program	$50,000	$943,024
Targeted Safety Improvement Program (TSIP)	$450,000	$8,150,000
Transportation Concurrency Program	$100,000	$1,800,000
Undergrounding Program	$100,000	$1,800,000
Parking Program	$125,000	$2,250,000
Transit Program	$175,000	$3,150,000
Transportation Demand Management (TDM)	$967,000	$17,406,000
Total TFP Program Budget/Cost	**$5,547,000**	**$121,313,100**

Programs

There are 15 programs in the TFP listed in Appendix G. These programs encompass many citywide projects and activities focused on advancing a clear objective, as well as having enough flexibility to be responsive to the community and leveraging opportunities. Focus is on the following objectives:

- Advance delivery of the TFP: move projects and programs toward implementation and delivery through strategic practices including system measurement, conditions modeling, design efforts and maximized leveraging through grants and partnership funding. The overall objective is to advance delivery of the TFP in support of the land use vision. (Capital Improvement Management and Concurrency Programs)
- Safety: address the safety needs for all transportation users by investigating, identifying, mitigating, and preventing excessive risk or damages related to the transportation system. The program objective is to assure that basic safety needs are met throughout the city. (Neighborhood Traffic Calming, Street Light, Targeted Safety Improvements,, and Undergrounding Programs)
- Preservation: maintain transportation infrastructure in a "state of good repair." The program addresses the preservation of major capital transportation infrastructure (bridges, pavements, and sidewalks/curbs) through inspection, rehabilitation, renovation, and replacement. (Bridge Repair, Channelization, Contingency, and Pavement Management programs)
- Active Transportation: enable and encourage pedestrian and bicycle transportation through infrastructure, partnerships, and education. (Bicycle and Pedestrian Programs)
- Parking: provide improved access to businesses by creating and maintaining managed short-term and long-term parking spaces. (Parking Program)
- Transit Service: provide travel choices by increasing the amount of transit service in the community through partnerships with transit agencies, local employers, and nearby communities. (Transit Service Program)
- Business Mobility and Community Travel Choices: maximizes the efficient use of transportation infrastructure through travel choices, market development, travel resources, and streamlined regulation. (Transportation Demand Management Program)

Funded Portion of Buildout Plan

To fully fund all of the needed projects in the Buildout Plan requires more revenue than is forecast for the financially constrained 18-year TFP (Figure 8). The estimated cost to build all projects within the Buildout Plan is $922 million and the available revenues for the 18-year TFP are $369 million or about 40% of the Buildout Plan.

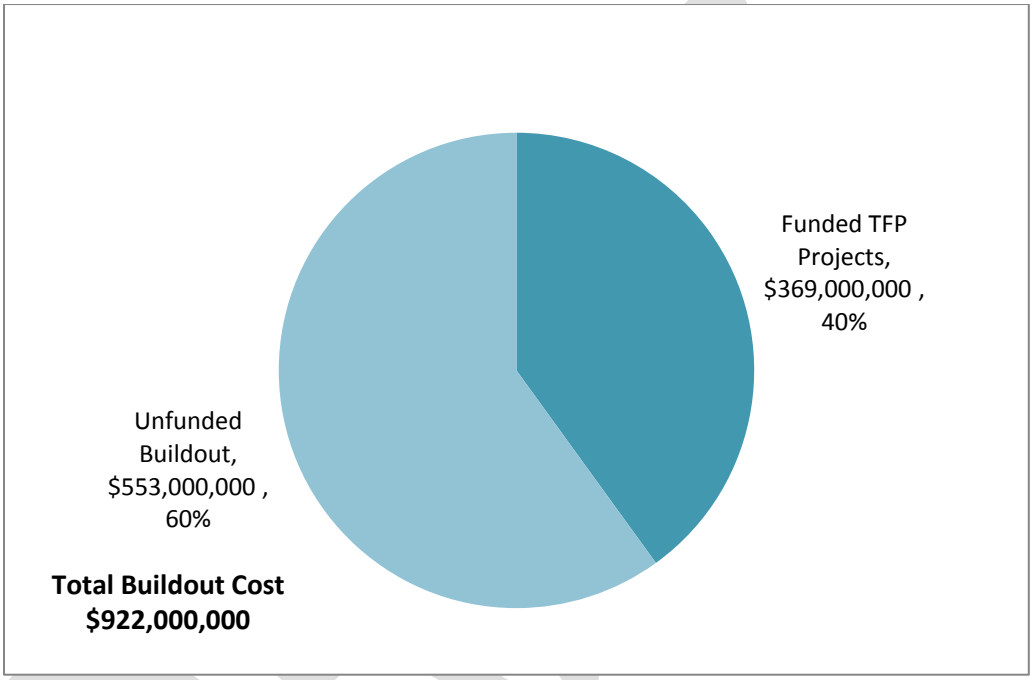

Figure 8. Funded portion of Buildout Plan

Stability of Revenue Sources:

- Gas tax revenue is based on consumption - gasoline tax revenues will decrease as drivers change to other modes of travel and choose vehicles that are more fuel efficient.
- REET is tied to the economy and local real estate market.
- General Fund is tied to economy plus City policy –in addition, in order to fund maintenance and operations on already built transportation infrastructure, the amount of General Fund revenue available for new transportation projects may decrease over time.
- Grant awards are sought in a highly competitive market for both federal and state grants and are tied to the availability of funding.
- Developer contributions have decreased due to plan-based concurrency system and are difficult to forecast in the outer years.

Potential Revenue Sources

	Potential Revenue Sources	Description
INCREASE EXISTING RATES OR FEES	**Increase Business Tax Rate:**	The current rate for Transportation is $57 per FTE per year.
	Sales Tax Increase:	Requires voter approval; dedicated to transportation projects
	Increase Impact Fee Rates:	Rates were most recently updated in late 2007; since then there have been small inflationary increases.
	Gas Tax Increase:	Cities and counties receive a share
INCREASE PROPERTY TAX/ VEHICLE	**Vehicle License Fee:**	Increase $20 per vehicle councilmanically or up to $100 per vehicle with voter approval per current legislative authority. Seek legislative approval for councilmanic authority up to $40 per vehicle.
	Levy Lid Lift:	Requires 50% voter approval and can be dedicated toward transportation improvements into perpetuity or for a specified time.
	Voter Approved Bond Issue for Transportation:	Requires 60% voter approval of a property tax increase to pay for particular improvements financed over a specified time period.
	Motor Vehicle Excise Tax (MVET):	Councilmanic or public vote with revenue distributed for transit and roads
OTHER REVENUE SOURCES	**LID/Transportation Benefit District for specific projects or groups of projects:**	Requires voter approval; can be used to fund a portion of a project or group of projects based on appraisal of affected properties and value added by the improvements.
	Street Utility:	Pay for street maintenance and overlays currently funded by General Fund through a utility.